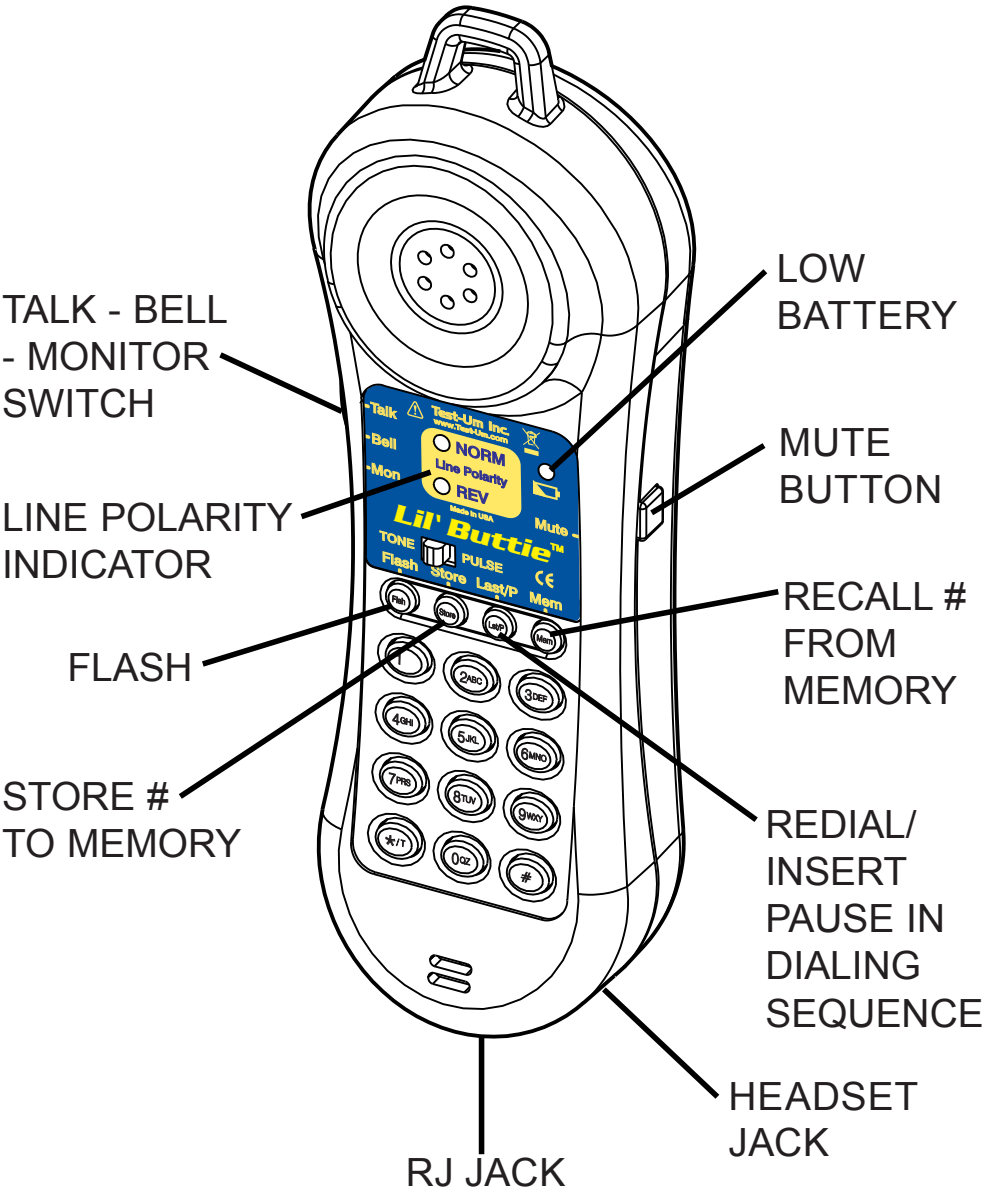
# Lil' Buttie™ Telephone Test Set

## User's Guide

www.jdsu.com/know

JDSU


TALK - BELL - MONITOR SWITCH
LINE POLARITY INDICATOR
FLASH
STORE # TO MEMORY
RJ JACK
LOW BATTERY
MUTE BUTTON
RECALL # FROM MEMORY
REDIAL/ INSERT PAUSE IN DIALING SEQUENCE
HEADSET JACK
Talk
Bell
Mon
Test-Um Inc.
NORM
Line Polarity
REV
Lil' Buttie™
Mute
TONE
PULSE
Flash
Store
Last/P
Mem

## *Caution*

*Please follow correct safety practices when operating this unit. Do not connect this unit to 110 volt or 220 volt AC electric power lines. In bell mode, any signal applied to the unit with more than 250V peak-to-peak voltage or resulting in more than 7 mA of rms current through ring or tip for a prolonged period of time could damage the unit. Correct operation is entirely the responsibility of the user. Should the Lil' Buttie, intentionally or by accident, be connected to electric power, all warranties are immediately null and void.*

# General Description

Lil' Buttie™ is a self-contained, self-powered, portable telephone test set for use by installers, repair technicians, and other authorized personnel for temporary communications and to test the operational service and installation of telephone/data lines.

A compact size and comfortable ergonomic shape makes it small enough to carry in your pocket or to wear on your belt, while still retaining the normal earpiece-to-microphone

dimensional spacing for comfortable use while resting on the shoulder.

Included headset jack and ear-mounted headset allows for hands-free operation. Headset is compact enough to fit in a shirt pocket and can be worn on either ear. Its unobtrusive design makes it easy to use while wearing a hard hat or inclement weather clothing.

The body is made of high impact resistant ABS to withstand the rough handling and shocks that craft tools are normally subjected to in their everyday use.

A belt loop provides a convenient and secure location for the attachment of the unit to various locations. An optional belt clip attachment is also provided.

The modular jack cord set with strain relief feature allows for easy field replacement or direct connection to modular wall jack with a standard phone cord set.

# Features

- Tone and Pulse Dialing
- Microphone Mute Feature
- Last Number Redial - 32 Digits
- Continuous Line Polarity Indication (TALK or MONITOR)
- Electronic Ringer
- Amplified Line Monitor for volume levels comparable to “off hook” operation.
- Modular cord set attachment
- Low Battery Indicator
- Headset Jack for hands-free operation
- Battery-Powered Monitor Mode with auto power off on dead lines or when disconnected.

# Function Switches, Buttons, and LEDs

**Talk-Bell-Monitor Switch** - This three-position slide switch is located on the side of the unit below the receiver. It is used to select the mode of operation.

**Talk** - This position creates an off-hook condition. In this mode, the unit can be used for signaling, conversation and testing, just like an ordinary telephone.

**Bell** - This position connects the internal electronic ringer for receipt of incoming ring signals. This on-hook mode also isolates both the testing and speech circuits from the line.

**Monitor** - The battery is off in this mode. This position connects the test set through a high impedance coupling. This on-hook connection allows for telephone line monitoring without disturbing conversations, network signaling, or data transmissions. In this mode, the unit's speech, ring and test circuits are isolated from the line.

**Tone-Pulse Switch** - This two-position slide switch is used to select the dialing mode. The TONE position selects DTMF signaling. The PULSE position selects rotary style pulse dialing.

**Mute** - This button is located on the opposite side of the Talk-Bell-Monitor switch. Press and hold to shut the unit's transmitter off. This feature may also be used to improve communications in noisy locations where it is difficult for the user to hear a person on the other end of the line.

**Flash** - When pressed, causes a 0.6 second interruption of the loop current (hook flash). Usually used for register recall, to put a call on hold, to activate a second line, or where some special function needs to be activated. */T When pressed in pulse mode, switches from PULSE to TONE dialing mode.

**Store** - Press Store, enter the number you wish to store, press Store and the location on the numeric keypad (0-9) where you wish to store the number. Ten 17 digit numbers can be stored.

**Last/P** - When pressed first, the last number dialed will be redialed from the unit’s internal memory. When pressed after another digit, a pause of approximately 3.6 seconds is inserted in the dialing sequence for PBX or Centrex switch dialing or other systems that require an intermediate access digit in order to access a line.

**Mem** - To retrieve a stored number, press Mem and the numeric key (0-9) you stored the number to and the number will be automatically dialed.

**Line Polarity Indicators**

**NORM** - A green LED indicates correct polarity

**REV** - A red LED indicates reversed line polarity

**Battery Low (BATT LOW)** - When operated in the Monitor or Talk mode, the LED will light up if low battery voltage is detected.

# Operation

***NOTE**: Always position the Talk-Bell-Monitor Switch in the Monitor position before connecting to a subscriber line to avoid possibly compromising any transmission in progress.*

## Connecting to a Line

*Monitor*

1. Select the Monitor mode.
2. Connect the RED cord set lead to Ring (-) and BLACK cord set lead to Tip (+).
3. NORM or REV polarity LED will come on if the line is powered. Listen for voices, ambient noise, or buzzing sounds, indicating digital data.

   *Note: If detected, the Low Batt LED will indicate a low operating voltage in this mode.*

*Dialing*

1. Select the Monitor mode.
2. Connect the RED cord set lead to Ring (-) and BLACK cord set lead to Tip (+).
3. Confirm that the line is not in use.
4. Position the Tone-Pulse Switch to either tone or pulse dialing.

5. Select the Talk mode and confirm that dial tone is present.
6. Proceed with dialing, line testing, etc.

## Mixed-Mode Dialing

In certain situations, it may be necessary to set up a call using both Pulse and Tone dialing. In this situation, a number can be entered in the Pulse mode then by pressing the */T button, the unit will switch to Tone mode so that tones can be sent to devices such as answering machines, etc. that are activated by specific tone codes.

## Last Number Redial

The last number dialed can automatically be redialed in either the Tone or Pulse modes. To redial the last number, switch from Talk to Monitor then back to Talk mode. Once you have confirmed a dial tone press the Last/P button on the keypad.

*Ringer*

1. Select the Bell mode.
2. Connect the RED cord set lead to Ring (-) and BLACK cord set lead to Tip (+).
3. The unit will now "ring" when ringing voltage is detected on the line.

4. To answer the call, switch the unit to TALK.

5. To disable the ringer, switch the unit to MONITOR mode.

## Polarity Check

The Lil' Buttie indicates Polarity continuously in Monitor and Talk modes as long as the line is powered.

1. To test, select the MONITOR or TALK mode.

2. Connect the BLACK cord set lead to Ring (+) and RED cord set lead to Tip (-).

3. The red LED will light up if the leads are reversed and the green LED will light up if the polarity is correct.

# Line Cord Connections

The Lil' Buttie is designed with a standard 6-position modular jack for quick connection to various cord sets. The jack is located at the base of the unit below the microphone. To replace the cord set, simply remove the strain relief attachment screw and unplug the cord set. Insert the new cord set and replace the terminal and screw.

# Models, Options & Accessories

| Ordering number | Description |
|---|---|
| LB100 | Lil' Buttie telephone test set with piercing pin clips |
| LB110 | Lil' Buttie telephone test set with angled bed-of-nails clips |
| LB110-BT | Lil' Buttie telephone test set with angled bed-of-nails clips and protective rubber boot |
| LB110UK/AUS | Lil' Buttie telephone test set with angled bed-of-nails clips (non-N. America 100ms hook flash, 37/63 make/break ratio) and protective rubber boot |
| LB115 | Lil' Buttie telephone test set with angled bed-of-nails clips and rugged hook-style belt clip |
| LB10B | RJ11 to alligator - 48" cord with strain relief |
| LB25 | RJ11 to piercing pin - 48" with strain relief |
| LB30B | RJ11 to angled bed-of-nails clips - 48" with strain relief |

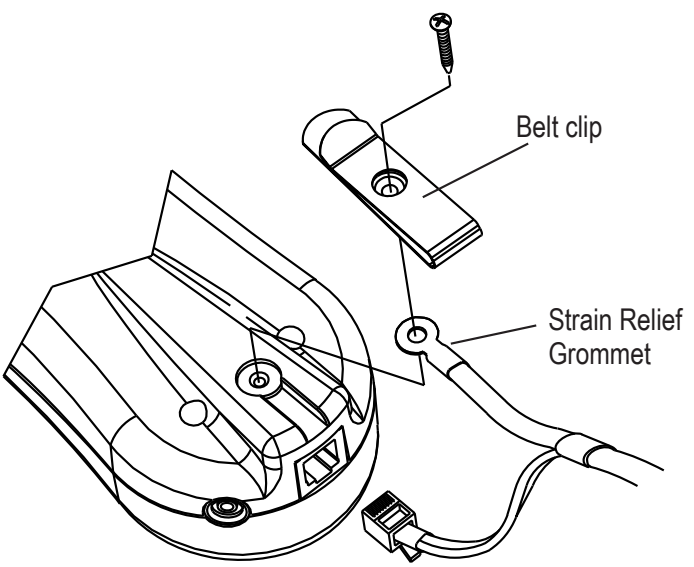
## Headset

The included headset can be utilized when a hands-free operation is preferred. Plug the headset into the receptacle located at the base of the unit next to the modular plug receptacle. The headset can be used for either ear by rotating the microphone position 90 degrees.

***NOTE**: When the headset is plugged in, the internal handset is disconnected.*

## Belt Clip Attachment

To install the Belt Clip Attachment, remove the strain relief attahment screw and position the Belt Clip as shown.  Attach the clip using the provided 3/8" flat head screw.  Take care not to over torque the screw to cause damage to the body.



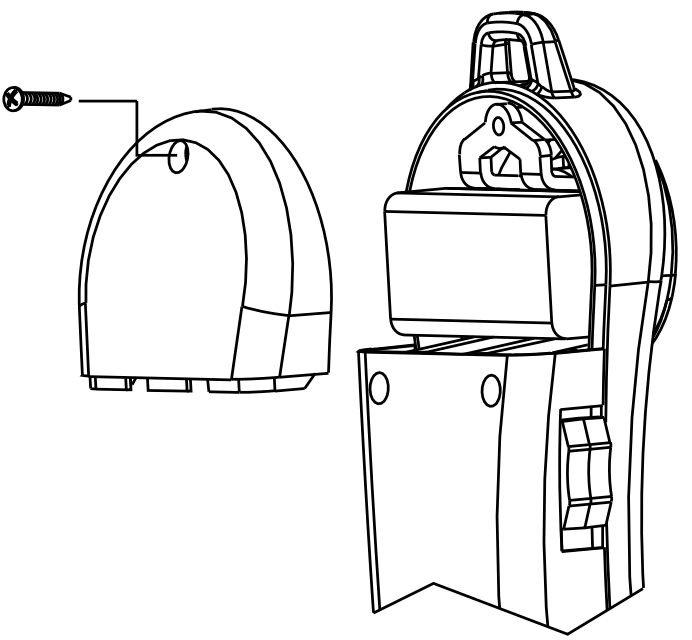
# Optional Accessories

For a complete description of optional Field Kits and accessories, visit out web site www.jdsu.com/know.

# Battery Installation

Battery not included. Should the Batt Low LED indicate low battery, the battery should be replaced as shown below.

1. Using a #1 Phillips screwdriver, unscrew and remove the battery cover on the back of the Lil' Buttie.
2. Connect a 9V Alkaline battery to the battery snaps.
3. Slide the battery into the cavity.
4. Close the battery cover and replace the screw. Do not overtighten. When the battery is low, the round indicator light above the battery icon will be on and the battery should be replaced as soon as possible.



# Specifications

**Electrical**

Return Loss — @ 600 ohms: Greater Than 14dB
Line Current Range: 15 to 85 mA
Apparent Line Resistance:  275 ohms at 20mA

**Rotary Dial Output**

Pulse Rate: 10 pps +/- 10%
M/B Ratio: 60/40% +/- 2 %
Interdigit Interval: 820 mSec
Leakage During Break: >120 Kohms

**DTMF Output** (into 600 ohms )

Tone Frequency Error: +/- 1.5%
Tone Level —
    High Group: -6dBm +/- 2dB
    Low Group: -8dBm +/- 2dB
High vs Low Tone Difference:  2dB +/- 1dB

**Memory Dialing**

Type: Last Number Redial
Mode: Tone and Pulse
Retention: with battery > 2yrs, without 8 min. nominally
Capacity: 32 Digits

**Ringer**

Electronic Dual Tone

**Physical**

Length without Lanyard: 7.25 in (18.4 cm)
Width: 2.50 in (6.4 cm )
Height: 1.68 in (4.3 cm )
Weight with Cord Set: 8 ozs. (227 gms)

**Environmental**

Temperature —

operating: -10°C to 60°C
storage: -40°C to 66°C

***Specifications subject to change***

# Maintenance

The test set may be cleaned with a damp cloth. If heavy accumulations of dirt are present, a small amount of liquid soap may be applied to the cloth to assist in cleaning. Do not use solvents, scouring powders, or other abrasive cleaners as they may scratch the unit and/or cause malfunctions.

Cord sets should be periodically checked for shorts, continuity, or obvious signs of wear, such as fraying or loose/damaged test clips.

# Customer Services

This section provides a description of customer services available through JDSU (including returns policies and procedures) and warranty information.

**Customer Service (Standard Services)** Customer Service accompanies the sale of every JDSU product. Customer Service services include:

- Technical Assistance (Business Hour)
- Instrument Repair (Under Warranty Repair, Calibration Services, and Upgrade Services)
- Immediate Return Authorizations

***Technical Assistance*** Expert business hour technical support is included with your product.

***Instrument Repair*** Our service centers provide repair, calibration, and upgrade services for JDSU equipment. JDSU understands the impact of equipment down time on operations and is staffed to ensure a quick turnaround. Available services include the following:

*Product Repair* — All equipment returned for service is tested to the same rigorous standards as newly

manufactured equipment. This ensures products meet all published specifications, including any applicable product updates.

*Calibration* — JDSU's calibration methods are ISO approved and based on national standards.

*Factory Upgrades* — Any unit returned for a hardware feature enhancement will also receive applicable product updates and will be thoroughly tested, ensuring peak performance of the complete feature set.

***Equipment Return Instructions*** Please contact your regional Technical Assistance Center to get a Return or Reference Authorization to accompany your equipment. For each piece of equipment returned for repair, attach a tag that includes the following information:

- Owner's name, address, and telephone number.
- The serial number (if applicable), product type, and model.
- Warranty status. (If you are unsure of the warranty status of your instrument, contact Technical Assistance.)
- A detailed description of the

problem or service requested.

- The name and telephone number of the person to contact regarding questions about the repair.
- The return authorization (RA) number (US customers), or reference number (European Customers).

If possible, return the equipment using the original shipping container and material. If the original container is not available, the unit should be carefully packed so that it will not be damaged in transit; when needed, appropriate packing materials can be obtained by contacting JDSU Technical Assistance. JDSU is not liable for any damage that may occur during shipping. The customer should clearly mark the JDSU-issued RA or reference number on the outside of the package and ship it prepaid and insured to JDSU.

## Warranty Information

JDSU guarantees that its products will be free of all defects in material and workmanship. This warranty extends for the period of 12 months for test instruments and 3 months for cables from date of manufacture or purchase (proof of purchase required).

All product deemed defective under this warranty will be repaired or replaced at JDSU's discretion. No further warranties either implied or expressed will apply, nor will responsibility for operation of this device be assumed by JDSU.

## WEEE Directive Compliance

JDSU has established processes in compliance with the Waste Electrical and Electronic Equipment (WEEE) Directive, 2 002 /96/EC. This product should not be disposed of as unsorted municipal waste and should be collected separately and disposed of according to your national regulations. In the European Union, all equipment purchased from JDSU after 005 -08 -13 can be returned for disposal at the end of its useful life. JDSU will ensure that all waste equipment returned

is reused, recycled, or disposed of in an environmentally friendly manner, and in compliance with all applicable national and international waste legislation. It is the responsibility of the equipment owner to return the equipment to JDSU for appropriate disposal. If the equipment was imported by a reseller whose name or logo is marked on the equipment, then the owner should return the equipment directly to the reseller. Instructions for returning waste equipment to JDSU can be found in the Environmental section of JDSU's web site at www.jdsu.com. If you have questions concerning disposal of your equipment, contact JDSU's WEEE Program Management team at WEEE.EMEA@jdsu.com.

Notes:

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*Document Information*

*Doc. # TU9822*

*Revision 501, 06-08*

*English*

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